Appendix

1. (Original) A composition comprising a polymeric material having a rheology such that the slope (or S) determined by linear least squares regression, of a plot of the natural log of loss modulus (or G") versus natural log of storage modulus (or G') is greater than [0.635*(melt index)+13.2]/[(melt index)+16.6], and wherein the polymeric material has a CDF RI fraction less than 0.23 of a GPC chromatogram which has a molecular weight above 85,000 g/mol, and a CDF LS fraction of more than 0.07 at a conventional GPC molecular weight of 1,750,000 g/mol or greater.

2. (Original) The composition of Claim 1 wherein the polymeric material has a melt strength less than about 5 cN.

3. (Original) The composition of Claim 1 wherein the polymeric material comprises LDPE.

4. (Original) The composition of Claim 1 wherein the polymeric material comprises a blend of at least two polymeric materials.

5. (Original) The composition of Claim 1 wherein the polymeric material comprises Linear PE.

6. (Original) The composition of Claim 3 wherein the LDPE comprises a high molecular weight highly branched component with an MWD greater than 10 and a Mw(absolute)/Mw(GPC) ratio greater than 3.0.

7. (Original) The composition of Claim 6 wherein the LDPE is made in an autoclave reactor with chilled ethylene feed below 35°C operating in single phase mode.

8. (Original) The composition of Claim 1 wherein the polymeric material has a melt index greater than 10 g/10min.

9. (Original) The composition of Claim 8 wherein the polymeric material has a melt index greater than about 13 g/10min.

10. (Original) The composition of Claim 8 wherein the polymeric material has a melt index less than about 100 g/10min.

11. (Original) The composition of Claim 1 wherein the polymeric material has a Mark-Houwink plot where the slope is less than 0.25 in the absolute molecular weight range between 300,000 and 3,000,000 g/mol.

12. (Original) The composition of Claim 1 wherein the value for S is at least 1% greater than [0.635*(melt index)+13.2]/[(melt index)+16.6].

13. (Original) The composition of Claim 12 wherein the value for S is at least 2% greater than [0.635*(melt index)+13.2]/[(melt index)+16.6].

14. (Original) The composition of Claim 1 wherein the polymeric material has a CDF RI fraction less than 0.21 of a GPC chromatogram which has a molecular weight above 85,000 g/mol.

15. (Original) The composition of Claim 1 wherein the polymeric material has a CDF RI fraction less than 0.20 of a GPC chromatogram which has a molecular weight above 85,000 g/mol.

16. (Original) The composition of Claim 1 wherein the polymer material has a CDF LS fraction greater than 0.09 of a GPC chromatogram which has a molecular weight above 1,750,000 g/mol.

17. (Original) The use of a composition according to Claim 1 to make a cast film, profile extrusion, coated substrate, extrusion lamination or extrusion coated substrate.

18. (Withdrawn) In a process for extruding a polymeric material onto a substrate, the improvement comprising: using a polymeric material having a rheology such that the slope (or S) determined by linear least squares regression, of a natural log-natural log plot of loss modulus (or G") versus storage modulus (or G') is greater than [0.635*(melt index)+13.2]/[(melt index)+16.6].

19. (Withdrawn) The process of Claim 18 wherein the neck-in observed is less than 3 inches when running at a line speed of 440 ft/min.

20. (Withdrawn) The process of Claim 18 wherein the neck-in observed is less than 2.5 inches when running at a line speed of 440 ft/min.

21. (Withdrawn) The process of Claim 18 wherein the neck-in observed is less than 2 inches when running at a line speed of 440 ft/min.

22. (Withdrawn) The process of Claim 18 wherein the draw down is at least 1500 ft/min.

23. (Withdrawn) The process of Claim 18 wherein the polymeric material has a melt strength of less than 5 cN.

24. (Withdrawn) A polymeric film layer having a rheology such that the slope (or S) determined by linear least squares regression, of a natural log-natural log plot of loss modulus (or G") versus storage modulus (or G') is greater than [0.665*(melt index)+14.2]/[(melt index)+16.6], and wherein the polymeric material has a CDF RI fraction less than 0.23 of a GPC chromatogram which has a molecular weight above 85,000 g/mol, and a CDF LS fraction of more than 0.07 at a conventional GPC molecular weight of 1,750,000 g/mol or greater.

25. (Withdrawn) The film layer of claim 24 wherein the layer has a CDF LS fraction of more than 0.09 at a conventional GPC molecular weight of 1,750,000 g/mol or greater.

26. (Withdrawn) The film layer of Claim 24 in which the film layer was produced using an extrusion coating, extrusion lamination, or cast film process.

27. (Withdrawn) A composition of matter comprising:

a. from about 10 to about 25 percent by weight of the composition of a high pressure low density type polyethylene resin having a melt index (I_2) less than about 2, a molecular weight distribution greater than about 10, a Mw(absolute)/Mw(GPC) ratio greater than about 3.0, and a melt strength greater than about 24.1 - 18.0*log10(MI); and

b. from about 90 to about 75 percent by weight of the composition, of a Linear PE having a density in the range of 0.97-0.857 g/cc and a melt index (I_2) in the range of 20-100 ;

wherein the MI of the composition of matter is greater than about 10 g/10 minutes.

28. (Withdrawn) The composition of Claim 27 in which component a) has a melt index (I_2) less than about 1 g/10 minutes.

29. (Withdrawn) The composition of Claim 27 wherein the composition has a melt strength less than about 5 cN.

30. (Withdrawn) The composition of Claim 27 wherein the Mw(absolute)/Mw(GPC) ratio of component (a) is greater than 3.2.

31. (Withdrawn) The composition of Claim 27 wherein the Mw(absolute)/Mw(GPC) ratio of component (a) is greater than 3.5.